

What is claimed is:

1. A method of preventing apolipoprotein E toxicity to a cell comprising treating said cell with a compound capable of inhibiting apolipoprotein E toxicity.

Sub A1
2. The method of Claim 1, wherein the compound is selected from the group consisting of polyvinyl sulfate, pentosan polysulfate, dextran sulfate, heparan sulfate and mixtures thereof.

3. The method of Claim 1, wherein the compound further comprises naphthalenesulfonic acid covalently bonded to a phenyl or naphthyl group.

4. The method of Claim 2, wherein the naphthalenesulfonic acid is covalently bonded to a phenyl or naphthyl group through a diazo or amide bond.

5. The method of Claim 1, wherein the compound is selected from the group consisting of ponceau S, Evan's blue, suramin sodium, direct blue 15, calconcarboxylic acid, amaranth, trypan blue, congo red, benzopurpurin 4b, Chicago sky blue 6b, sulfonazo III and mixtures thereof.

6. The method of Claim 1, wherein the compound further comprises a triphenylmethane core modified with at least one sulfate or carboxylate group.

7. The method of Claim 1, wherein the compound further comprises a triphenylmethane core modified with at least one benzoic acid or benzenesulfonic acid substituent.

8. The method of Claim 7, wherein the benzoic acid or benzenesulfonic acid substituents are covalently bound to the phenyl groups of the triphenylmethane through a nitrogen bond.

Sub A2
9. The method of Claim 1, wherein the compounds are selected from the group consisting of aurintricarboxylic acid, aniline blue, methyl blue, light green SF yellowish, Coomassie brilliant blue G-250, Coomassie brilliant blue R-250, and mixtures thereof.

09892308.062701

10. The method of Claim 1, wherein the compound further comprises a tetrabromophenolsulfonphthalein.

11. The method of Claim 1, wherein the compound is selected from the group consisting of bromophenol blue, bromocresol green and mixtures thereof.

12. The method of Claim 1, wherein the compound is selected from the group consisting of cibacron blue, thiazol yellow G, sulfobromophthalein, biebrich scarlet and mixtures thereof.

13. The method of Claim 1, wherein inhibiting apolipoprotein E toxicity comprises inhibiting binding of apolipoprotein E or fragments of apolipoprotein E to a cell.

14. The method of Claim 1, wherein the fragments of apolipoprotein E comprise residues 141-147 of apolipoprotein E.

15. The method of Claim 1, wherein inhibiting apolipoprotein E toxicity comprises inhibiting production of a peptide fragment of apolipoprotein E comprising residues 141-147 of apolipoprotein E.

16. A method of treating conditions associated with apolipoprotein E toxicity, comprising administering a composition comprising a pharmacologically effective amount of a compound that inhibits apolipoprotein E toxicity.

17. The method of Claim 16, wherein the compound is selected from the group consisting of polyvinyl sulfate, pentosan polysulfate, dextran sulfate, heparan sulfate and mixtures thereof.

18. The method of Claim 16, wherein the compound further comprises naphthalenesulfonic acid covalently bonded to a phenyl or naphthyl group.

19. The method of Claim 18, wherein the naphthalenesulfonic acid is covalently bonded to a phenyl or naphthyl group through a diazo or amide bond.

098922308-062701

SAB
R31

Sub
A4

20. The method of Claim 16, wherein the compound is selected from the group consisting of ponceau S, Evan's blue, suramin sulfate, direct blue 15, calconcarboxylic acid, amaranth, trypan blue, congo red, benzopurpurin 4b, Chicago sky blue 6b, sulfonazo III and mixtures thereof.

21. The method of Claim 16, wherein the compound further comprises a triphenylmethane core modified with at least one sulfate or carboxylate group.

22. The method of Claim 16, wherein the compound further comprises a triphenylmethane core modified with at least one benzoic acid or benzenesulfonic acid substituent.

23. The method of Claim 22, wherein the benzoic acid or benzenesulfonic acid substituents are covalently bound to the phenyl groups of the triphenylmethane through a nitrogen bond.

Sub
A5

24. The method of Claim 16, wherein the compounds are selected from the group consisting of aurintricarboxylic acid, aniline blue, methyl blue, light green SF yellowish, Coomassie brilliant blue G-250, Coomassie brilliant blue R-250, and mixtures thereof.

25. The method of Claim 16, wherein the compound further comprises a tetrabromophenolsulfonphthalein.

26. The method of Claim 16, wherein the compound is selected from the group consisting of bromophenol blue, bromocresol green and mixtures thereof.

27. The method of Claim 16, wherein the compound is selected from the group consisting of cibacron blue, thiazol yellow G, sulfobromophthalein, biebrich scarlet and mixtures thereof.

28. The method of Claim 16, wherein inhibiting apolipoprotein E toxicity comprises inhibiting binding of apolipoprotein E or fragments of apolipoprotein E to a cell.

09892308.062701

29. The method of Claim 28, wherein the fragments of apolipoprotein E comprise residues 141-147 of apolipoprotein E.

30. The method of Claim 16, wherein inhibiting apolipoprotein E toxicity comprises inhibiting production of a peptide fragment of apolipoprotein E comprising residues 141-147 of apolipoprotein E.

31. The method of Claim 16, wherein the condition is Alzheimer's-type senile dementia.

32. The method of Claim 16, wherein the condition is a condition associated with cerebral amyloidosis.

33. The method of Claim 16, wherein the condition is hyperlipidemia.

34. The method of Claim 16, wherein the condition is selected from the group consisting of coronary heart disease, atherosclerosis, head injury, ischemic stroke, intracerebral hemorrhage, normal pressure hydrocephalus, HIV-associated dementia and HIV-associated peripheral neuropathy.

09892308 062701
10/29/00 80226860

